

TITLE OF INVENTION: **PERSONAL ARTICLE HOLDER WITH ACCOMPANYING TOOL**

INVENTOR: **ROBERT GERALD KUSHNER**

BACKGROUND OF THE INVENTION.

1. Technical Field.

[0001] The present invention generally relates to a device for holding personal articles such as eyeglasses and the like. More particularly, but not exclusively, the present invention relates to a device that holds eyeglasses or sunglasses, pens, pencils or any other small object and includes one or more tools built into the device. The device may be attached to any surface such as appliances, furniture, computers, clothing, clothing accessories and flat surfaces such as automobile visors and books where a user may stow personal articles in the device and/or access the tool built into the device.

2. Background Art.

BRIEF SUMMARY OF THE INVENTION.

[0002] Many people periodically wear eyeglasses and/or sunglasses. However, at certain times, a wearer of eyeglasses or sunglasses (collectively referred to herein as "glasses") may wish to remove and store their glasses for short periods when the glasses are not needed. For example, a wearer of sunglasses may remove them during evening hours when sunlight begins to fade. The wearer may typically remove them and place them in a convenient location such as on the dashboard of the car, on an adjacent seat, in a cubbyhole or the like. These locations, while convenient, may subject the glasses to be susceptible to soiling, damage and/or loss. Consequently, there is a need for a holder of personal articles,

including glasses, which conveniently stores such items to prevent soiling, damage and/or loss.

[0003] Many attempts to provide such a holder have been made, some more successful than others. For example, U.S. Patents 6,134,753 and 5,794,312 to O'Mahony disclose holding devices including a clip portion for attaching the holding device to a desired surface and a clamping portion for securing the personal article or glasses.

[0004] U.S. Patent 5,941,487 to Keely discloses a retainer for holding eyeglasses that includes a retainer ring rotatably mounted to a clamping means. The clamping means secures the retainer to a desired surface, such as a automobile visor, while the retainer ring receives and secures the temple portion of a pair of eyeglasses.

[0005] U.S. Patent 5,975,476 to Mancinelli discloses a holder for securing eyeglasses to a visor including a body and a clip. The body receives the bridge of the eyeglasses with the temple bars of the glasses resting on top of the body. The clip is disposed on a portion of the body and forms a flexible clamp for securing the holder to a visor.

[0006] U.S. Patent 5,983,459 to Goldenberg discloses a clip for securing eyeglasses or sunglasses that slides onto an article of clothing. The clip is similar to a conventional money clip but has an elastic material to create a channel for receiving a temple of a pair of glasses.

[0007] U.S. Patent 6,210,003 to Chan discloses a personal article holder having a clamping body and a visor clip. And U.S. Patent 6,564,432 to Kushner, which is incorporated herein by reference, discloses a personal article holder having a

clamping body and a display window disposed on the clamping body for displaying desired images.

[0008] While these and other known retainers and holders for glasses and other articles may provide effective for protecting such items against loss, damage or soiling, they do not include a built in tool or accessory which may be utilized by a user in addition to stowing personal articles.

[0009] Accordingly, it is desired to provide a personal article holder that not only is capable of holding personal articles for a user but also includes a built in tool or accessory that may be removed from the personal article holder and utilized by the user.

SUMMARY OF THE INVENTION.

[0010] According to one aspect of the present invention a personal article holder includes an upper arm member hingedly connected to a lower arm member via a pivot mechanism and an attachment mechanism for attaching the personal article holder to desired surfaces. The personal article holder also includes a cavity for retaining one or more tools or accessories. The tool may include a calculator, paper and a writing utensil, a screwdriver, a lens cleaning device such as a microfiber cloth and/or a lens cleaning solution or any other tool or accessory which may be desirable to stow in a specified location.

[0011] In certain embodiments, the personal article holder thus provides a first storage location for storage of a user's personal article between a clamping body and a second storage location for a tool.

[0012] In other embodiments, the personal article holder includes the tool stored in the second storage location.

BRIEF DESCRIPTION OF THE SEVERAL VIEWS OF THE DRAWING.

[0013] Further aspects, features and advantages of the present invention will become apparent from the following description of the invention in reference to the appended drawing in which like numerals denote like elements and in which:

[0014] FIG. 1 is a side view of a personal article holder with embedded tool according to one aspect of the present invention;

[0015] FIG. 2 is a top view of the personal article holder of Fig. 1;

[0016] FIG. 3 is a top view of the of the personal article holder of Fig. 1 with the tool removed;

[0017] FIG. 4 is a perspective view of a tool which is removably insertable into the personal article holder of Fig. 3;

[0018] FIG. 5 is a top view of a personal article holder according to another aspect of the present invention;

[0019] FIG. 6 is a top view of a personal article holder according to a third aspect of the present invention; and

[0020] FIG. 7 is a perspective view of a personal article holder according to a fourth aspect of the present invention.

DETAILED DESCRIPTION OF THE INVENTION.

[0021] A personal article holder with accompanying tool according to one embodiment of the invention includes: a clamping body for securing the personal article and an attachment portion for securing the clamping body to a desired surface. The clamping body may generally include: (i) an upper arm member hingedly connected on one end to (ii) a lower arm member. On an opposite, non-hinged, end of the upper and lower arm members is a clasp device for securing the upper arm member to the lower arm member between closed and open positions.

The upper and lower arm members may each include a resilient cushion member that, when the clamping body is in a closed position, face each other to secure personal articles that have been placed there between.

[0022] The upper arm member preferably includes, on a side opposite its respective cushion member and/or along its side, a cavity for stowing a tool. The attachment portion is secured the lower arm member, opposite the side of its respective cushion member, so that, when attached to a surface, e.g., a car visor, refrigerator, or other surface, the cavity for stowing the tool is accessible or viewable by a person.

[0023] Referring to Figs. 1-4, a preferred example of a personal article holder with accompanying tool will now be described. Fig. 1 illustrates a side view of a personal article holder 10 with accompanying tool including a clamping body including upper arm 20 and lower arm 30 connected at one end by a pivot or hinge 40. The clamping body includes a space 50 between the upper arm 20 and lower arm 30 for securing portions of a personal article in holder 10. An attachment portion 35 is fixed to one of arms 20, 30 of the clamping body so that the clamping body may be attached to a variety of different surfaces.

[0024] Upper arm 20 includes one or more cavities 25 for retaining a tool 26 (for example, a calculator in Figs. 2 & 4). As used herein, a "tool" means an object that aids in accomplishing a task. While various example tools are described herein, the present invention is not limited to any particular type or category of tool. Cavity 25 may be a hollowed portion in holder 10 and tool 26 may be retained therein by virtue of one or more indentation and/or tabs on the cavity and/or tool.

[0025] Figs. 3 and 4 illustrate views of holder 10 and tool 26 removed from cavity 25. In one embodiment, tool 26 is a calculator or other electronic device that may

assist a user. In one implementation (Fig. 4), calculator 26 includes a display 402, a keypad 405, a processor (not shown) and an optional rotating panel 410. Display 402, keypad 405, and the processor are conventional components and thus not described in detail. Rotating panel 410, if included, serves two primary functions: (i) in a first position (shown in Fig. 4) panel 410 serves as a stand for calculator 26; and (ii) in a second position (not shown) panel 410 serves as a protective cover for display 402 and/or keypad 405. In this embodiment, panel 410 covers keypad 405 when calculator 26 is stowed in cavity 25. A top surface 412 of rotating panel 410 may also be used as a surface for an advertisement or promotion as it will be prominently displayed when calculator 26 is stowed in holder 10.

[0026] Referring back to the side view in Fig. 1, holder 10 also preferably includes cushion members 52 and 54 for gently but securely stowing portions of a personal article disposed in space 50 when holder 10 is in a closed position. As shown, upper arm 20 has cushion member 52 disposed on a lower or inside surface thereof. Conversely, lower arm 30 has cushion member 54 disposed on an upper or inside surface as well. Cushion members 52 and 54 may be fixed or removably attached to respective arms 20, 30 in any manner for one material to be secured to another, e.g., snaps, adhesive, VELCRO, etc. In one embodiment, cushion members 52 and 54 are fixed to the interior of the upper and lower arms using an adhesive. When the clamping body is in a closed position (depicted in Fig. 1), cushion members 52 and 54 may abut against one another or be separated by a small space for gripping a portion of a personal article placed there between.

[0027] Upper arm 20 and lower arm 30 of the clamping body may be made from any material rigid enough to provide support for a personal article, such as rigid plastics, ceramics, metals, woods or any combination thereof. In one embodiment,

upper and lower arms are formed in an injection mold using an ABS (Acrylonitrile-Butadiene-Styrene) plastic material, which may be tinted or colored to achieve a desired color. ABS plastics are used in preferred embodiments since they possess high strength and durability material characteristics and readily accept plating and painting to vary appearance and design of the device. The clamping body may be formed in any desired shape such as a circle, an oval, a rectangle, a square, a trapezoid or any other symmetrical or asymmetrical shape and may be any size or color desired.

[0028] Cavity 25 is preferably formed during injection molding of holder 10 (provided holder 10 is made from an injection molded plastic or resin) and is a recess or depression formed to accommodate a shape of the accompanying tool. As shown in Fig. 3, cavity 25 is formed in the same general shape as calculator 26 (Fig. 4) and retains calculator 26 via a tab or recess 27. There may also be more than one cavity and/or the cavity may be covered by a panel as described in other embodiments below.

[0029] Pivot 40 may be any type of rotating connector between upper arm 20 and lower arm 30. In one embodiment pivot 40 comprises an axial pin disposed through holes formed in the injection mold plastic of the respective upper and lower arms. In another embodiment, pivot 40 comprises divots or holes in an end of one arm (upper or lower) and corresponding protrusions in the opposite arm that mate with the divots or holes.

[0030] Attachment portion 35 may be any mechanism or arrangement for facilitating temporary or permanent fixation of clamping body to other surfaces. Examples of attachment portion 35 include a clip, a magnet, VELCRO, a suction cup, double sided tape, etc. In one embodiment, attachment portion 35 is a

tensioned wire attached to lower arm 30 similar to, but not limited to, the example shown in Fig. 1. With this arrangement, holder 10 may be utilized as a bookmark by clipping a desired portion of a book between wire 35 and lower arm 30. In another embodiment attachment portion 35 is a segment of double-sided tape (not shown) having one side adhere to the clamping body and readily attachable to a desired surface, such as a computer monitor, using the adhesive opposite side.

[0031] Fig. 5 illustrates an embodiment of the present invention in which a personal article holder 500 includes two cavities; a first cavity 525 for retaining a removable writing surface 526 such as a pad of paper or POST-IT type notes, and a second cavity (not shown) for retaining a writing utensil 536 such as a pencil or pen. The first cavity 525 is preferably conformed to a shape of the writing surface 526 and includes one or more tabs 528 for retaining writing surface 526 inside cavity 525. The second cavity may be formed as a hole through the sides of one of the arms 20, 30 (Fig. 1), for example, using a hole through the respective cushion member 52, 54 having a smaller diameter than writing utensil 536 and thus bias writing utensil 536 in place. Alternatively, or in addition, a cavity for retaining writing utensil 536 may be formed by a recess in the injection molded plastic as discussed with respect to the screwdriver embodiment below. One or more clips for holding writing utensil 536 could also be used.

[0032] Fig. 6 illustrates another embodiment of the invention in which a cavity 625 is formed in a personal article holder 600 in a shape to receive a screwdriver and/or wrench. In this embodiment, one or more tabs 628 are formed along an edge of cavity 625 such that a tool (such as screwdriver 626) snaps into and is retained in cavity 625. Finger recesses (not shown but refer to Fig. 1) may also be

included to enable a user to grasp and/or remove tool 626 while in its stowed position.

[0033] Turning to Fig. 7, in another embodiment of the present invention, a personal article holder 700 includes a cavity 726 shaped and/or dimensioned to accommodate one or more tools 735, 736. In this embodiment, cavity 726 is formed in one clamping arm of holder 700 and an access panel 725 is then provided to cover cavity 726 so that the user, when desired, may access and/or store tools such as lens cleaning cloth 736 or spray cleaning solution bottle 735. In this embodiment, cavity 726 and panel 725 collectively form a compartment for containing one or more tools.

[0034] Panel 725 may be opaque or transparent and may be hingedly connected to upper arm 720 on one end, e.g., using hinges 728. On an opposite end of panel 725 is tab 727 for securing into slot 729 located in arm 720. Slot 729 may include a release mechanism (not shown) for releasing and securing tab 727 of panel 725. Hinges 728 may be any type of arrangement for facilitating rotation of panel 725 between open and closed positions. In one embodiment, hinges 728 are C-shaped plastic extensions of panel 725 that rotate around corresponding axial members formed in upper arm 720. In other embodiments, tabs are used in place of hinges 728 so that panel 725 completely removes from holder 700 for access to cavity 726.

[0035] While panel 725 is illustrated in Fig. 7 as a rectangular shaped panel, it should be recognized that transparent member may be formed in any desired shape including, for example, ovals, circles, squares and any other symmetrical or asymmetrical shape. In one implementation of the present invention, panel 725 is a transparent material and includes a slot (not shown) for inserting pictures or an insert for viewing when panel 725 is in a closed position.

[0036] In addition to the cavities which retain the tools as described above, the personal article holders of the present invention will serve to hold a personal article, for example eyeglasses, in the clamping body, as is well known in the art.

[0037] Unless contrary to physical possibility, the inventor envisions the components of respective embodiments may be combined in any manner.

[0038] Although there have been described preferred embodiments of this novel invention, many variations and modifications are possible and the embodiments described herein are not limited by the specific disclosure above, but rather should be limited only by the scope of the appended claims.